GoMMAPPS Seabird Vessel Trip Report 1 - 18 September 2018 Fall Marine Mammal, Leg #2 R/V PISCES

Summary: The Gulf of Mexico (GoM) region is critical in affording key breeding, staging, and wintering habitats for North America's avifauna. Yet limited information is available to characterize the species composition, distribution, and abundance of birds Gulf wide, particularly given the large number of platforms (in the Central and Western Planning Areas), and cumulative level of oil and gas activity in the northern GoM region (2012, 2013). The Gulf of Mexico Marine Assessment Program for Protected Species (GoMMAPPS) Seabird Project anticipates being the most spatially and temporally extensive avian research effort ever conducted in the northern GoM. The GoMMAPPS Seabird Project will document the distribution, abundance, and diversity of birds so as to better inform regulatory decisions that influence the conservation of migratory avian resources (Seabird Science Plan 2016).

From 1 September – 18 September 2018, two GoMMAPPS seabird observers accompanied the GoMMAPPS marine mammal survey, Leg 2, aboard the *R/V Pisces* based at the NOAA National Marine Fisheries Service, Pascagoula, MS. Nick Metheny and James Panaccione conducted counts of all birds detected within a 300-m strip transect while the ship was underway (Balance and Force 2016) (*Figure 1*). Observers counted all seabirds for a total of ~181.5 hrs over 17 calendar days. No appreciable time was lost to inclement weather on this cruise leg. Survey time was generally 10 – 12.5 hrs/day, with ~6 hrs of additional observation effort on the first afternoon while on transit from port (1 September).

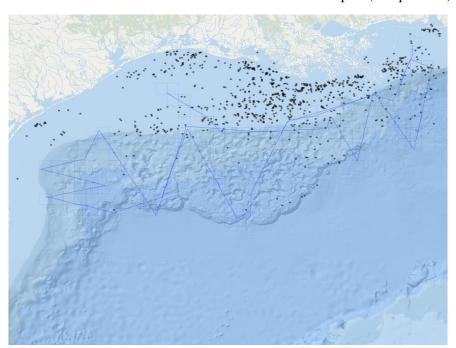


Figure 1. Map of the marine mammal and seabird track lines for Leg 2 of the 2018 GoMMAPPS fall survey aboard the R/V *Pisces*. Observers conducted strip transect surveys during parts or all of the scheduled cruise dates, as well as on transits between track lines beginning on 1 September and ending on the evening of 17 September. NOTE: blue track lines were completed during Leg 2 of the survey which started at Pascagoula, MS, and worked progressively to the W-SW before ending at Galveston, TX. Black dots on the map indicate locations of oil and gas platforms.

This GoMMAPPS seabird survey will provide key information for decision-makers. In general, spatial coverage by the R/V *Pisces* during this leg of the fall 2018 GoMMAPPS survey was widespread in offshore and pelagic waters of the Central and Western Planning Areas out to the EEZ (*Figure 1*). Several rare or casual species for the GoM were noted; a red-billed tropicbird and a red-footed booby. A first-ever Neotropic cormorant on a GoMMAPPS survey was detected. On 6 September, observers had 8 masked boobies in view simultaneously at one location in pelagic waters east-southeast of Port Aransas, TX, the

highest number ever seen locally on a GoMMAPPS survey. Off the MS River delta in deep water, observers recorded a few brown noddies, a species rarely seen in the GoM away from the FL Keys. Leg 2 tallied 32 Cory's shearwaters, probably the largest count for any GoMMAPPS survey to date. Observers detected 43 total species (23 species of pelagic, offshore, and coastal marine birds; see ¹ below) including a diverse assemblage of migrating species (see List below). The total count and number of birds/day were in the low range relative to other GoMMAPPS surveys conducted to date. In total for this leg, sightings of ~1,436 total birds (~967 seabirds; see List below) were entered in the SEEBIRD database, a detection rate of ~85 birds/d or ~8 birds/hr. A small number of sea turtles and marine mammals were also detected.

BIRD SPECIES LIST

- Audubon's shearwater¹
- band-rumped storm-petrel¹
- black tern¹
- bridled tern¹
- brown booby¹
- brown noddy¹
- brown pelican¹
- Cory's shearwater¹
- Forster's tern¹
- great shearwater¹
- laughing gull¹
- Leach's storm-petrel¹
- magnificent frigatebird¹
- masked booby¹
- Neotropic cormorant¹
- parasitic jaeger¹
- pomarine jaeger¹
- red-billed tropicbird¹
- red-footed booby¹
- royal tern¹
- sandwich tern¹
- sooty tern¹
- Wilson's storm-petrel¹

- Baltimore oriole
- bank swallow
- barn swallow
- blue-winged teal
- cliff swallow
- common nighthawk
- eastern kingbird
- great egret
- green heron
- little blue heron
- northern waterthrush
- osprey
- ruby-throated hummingbird
- sanderling
- snowy egret
- tree swallow
- tricolored heron
- yellow-crowned night-heron
- yellow warbler

¹ Both coastal and pelagic seabird representatives are included above the line and all other species (identified to species) are indicated below the line